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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/800,763	03/06/2001	Aki Korhonen	019703000210	3898

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EXAMINER

IQBAL, NADEEM

ART UNIT	PAPER NUMBER
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2184

DATE MAILED: 11/19/2003

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Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/800,763

Applicant(s)

KORHONEN, AKI

Examiner

Nadeem Iqbal

Art Unit

2184

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 06 March 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-18 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

Claims 1 and 13 are rejected under 35 U.S.C. 102(e) as being anticipated by Chew, (U.S. Patent number 6343260).

Chew teaches (col. 2, lines 20-23) a test system which verifies the ability of the USB devices to provide correct responses to a set of standard device requests. He also teaches (col. 2, lines 31-33) a test system which verifies the implementation of the USB architecture framework support in a computer system. The USB architecture consists of a library of interfaces, which provide channels of communication between a USB client driver and an associated USB device. He thus teaches limitations pertain to a system for testing a universal serial bus controller and a

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universal serial bus port. He also teaches (col. 2, lines 48-50) a host controller driver interfaces with the host controller, which in turn interfaces the software on the host system with the USB interconnect and the USB devices. He thus teaches a test control module, a device coupled to a universal serial bus host via the universal serial bus port. He also teaches (col. 2, lines 53-55) a command line interpreter through which a user can enter commands to perform specific operations and tests. He thus teaches test control module communicates with the test device to perform a series of tests on the universal serial bus host controller and the universal serial port.

***Claim Rejections - 35 USC § 103***

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 2-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chew, (U.S. Patent number 6343260).

As per claim 2, Chew does not explicitly disclose that the series of tests includes a voltage level test. Chew teaches (col. 2, lines 31-33) a test system which verifies the implementation of the USB architecture framework support in a computer system. He also teaches (col. 7, lines 44-46) that the test application can perform a series of tests to verify that the USB driver functions properly in response to USB interface function calls, and further teaches to

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perform standard device requests defined in chapter 9 of the USB specification. It would have been obvious to a person of ordinary skill in the art at the time the invention was made to realize that he would also perform a voltage level test since he teaches that the test application can perform a series of tests to verify that the USB driver functions properly in response to USB interface function calls, and further teaches to perform standard device requests defined in chapter 9 of the USB specification, thus would clearly be able to perform a voltage level test. ( Also see Table 1 and Table 2 functions verified).

As per claim 3, He also teaches (col. 8, lines 36-38) that the user can select the device at a particular port for certain tests and then switch to a different port and test the device connected to that port. He thus performs a full speed device detect test.

As per claims 4 & 5, He also teaches USBAI commands and functions corresponding that includes get-interface, synch\_frame, thus provides the ability to perform frame timing check.

As per claims 6 & 7, He also teaches USBAI commands and functions corresponding that includes get-interface, synch\_frame, used for isochronous device, thus provides the ability to perform isochronous transfer tests and bulk transfer test.

As per claims 8 & 9, He also teaches USBAI commands and functions corresponding that includes get-interface, start\_polling, command applies only to an interrupt endpoint, thus providing the ability to perform interrupt transfer test.

As per claim 10, He substantially teaches the claimed invention as disclosed related to claim 1 above. He also teaches (col. 2, lines 31-33) a test system which verifies the implementation of the USB architecture framework support in a computer system. The USB architecture consists of a library of interfaces, which provide channels of communication

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between a USB client driver and an associated USB device. He thus teaches limitations pertain to a system for testing a universal serial bus controller and a universal serial bus port. He also teaches (col. 2, lines 48-50) a host controller driver interfaces with the host controller, which in turn interfaces the software on the host system with the USB interconnect and the USB devices. He thus teaches a test control module, a device coupled to a universal serial bus host via the universal serial bus port. He also teaches (col. 2, lines 53-55) a command line interpreter through which a user can enter commands to perform specific operations and tests. He thus teaches test control module communicates with the test device to perform a series of tests on the universal serial bus host controller and the universal serial port. Chew does not explicitly disclose that the series of tests includes a voltage level test. Chew teaches (col. 2, lines 31-33) a test system which verifies the implementation of the USB architecture framework support in a computer system. He also teaches (col. 7, lines 44-46) that the test application can perform a series of tests to verify that the USB driver functions properly in response to USB interface function calls, and further teaches to perform standard device requests defined in chapter 9 of the USB specification. Thus would clearly able to perform a voltage level test. ( Also see Table 1 and Table 2 functions verified).

As per claim 11, He also teaches (col. 8, lines 36-38) that the user can select the device at a particular port for certain tests and then switch to a different port and test the device connected to that port. He thus perform a full speed device detect test. And also teaches USBAI commands and functions corresponding that includes get-interface, synch\_frame, thus provides the ability to perform frame timing check. And also teaches USBAI commands and functions corresponding that includes get-interface, synch\_frame, used for isochronous device, thus provides the ability to

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perform isochronous transfer tests and bulk transfer test. And also further teaches USBAI commands and functions corresponding that includes get-interface, start\_polling, command applies only to an interrupt endpoint, thus providing the ability to perform interrupt transfer test.

As per claim 12, He teaches (col. 3, lines 49-53) a USB host controller coupled to the USB, a host controller driver for driving the host controller and a set of USB interfaces which allow communications between a test application and the host controller driver. He also teaches (col. 6, lines 64-66) that test application includes modules configured to control testing of the different functions of the USB functionalities defined in the USB specification. He thus clearly would allow the test control module to determination whether the USB port is functioning.

As per claims 14 & 15, He also teaches (col. 8, lines 36-38) that the user can select the device at a particular port for certain tests and then switch to a different port and test the device connected to that port. He thus perform a full speed device detect test. And also teaches USBAI commands and functions corresponding that includes get-interface, synch\_frame, thus provides the ability to perform frame timing check, and also teaches USBAI commands and functions corresponding that includes get-interface, synch\_frame, used for isochronous device, thus provides the ability to perform bus signal tests and bulk transfer test. And also further teaches USBAI commands and functions corresponding that includes get-interface, start\_polling, command applies only to an interrupt endpoint, thus providing the ability to perform interrupt transfer test.

As per claim 16, He also teaches USBAI commands and functions corresponding that includes set\_config, reset, thus provides the ability to perform configuring the test device according to a USB protocol.

As per claim 17, He teaches (col. 3, lines 49-53) a USB host controller coupled to the USB, a host controller driver for driving the host controller and a set of USB interfaces which allow communications between a test application and the host controller driver, thus would include sending a request and sending the information to the test control module.

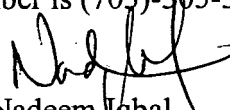
As per claim 18, He already teaches as stated above that test application includes modules configured to control testing of the different functions of the USB functionalities defined in the USB specification, thus would include communicating the information to the test control module and causing the test control module to analyze the information as claimed.

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nadeem Iqbal whose telephone number is (703)-308-5228. The examiner can normally be reached on M-F (8:00-5:30) First Friday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robert W Beausoliel can be reached on (703)-305-9713. The fax phone number for the organization where this application or proceeding is assigned is a central fax number (703)-872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703)-305-3900.

  
Nadeem Iqbal  
Primary Examiner  
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